

Listing of Claims:

- 1-7. (canceled).
8. (currently amended) A multimedia receiver apparatus comprising:
a plurality of decoders for decoding a plurality of multimedia streams; and
arbitration logic to map each of said multimedia streams to each of said
plurality of decoders based on processing load on each decoder and code rates of
each of said multimedia streams, wherein said arbitration logic maps said multimedia
streams to equalize said processing load on each decoder.
9. (canceled).
10. (currently amended) The apparatus as in claim 8[[9]] wherein said decoders
are Viterbi decoders.
11. (original) The apparatus as in claim 8 wherein said plurality of multimedia
streams are greater in number than said plurality of decoders.
12. (original) The apparatus as in claim 8 wherein said arbitration logic maps said
multimedia streams once upon system initialization.

13. (original) The apparatus as in claim 8 wherein said arbitration logic maps said multimedia streams continually as said multimedia streams are received and processed by said multimedia receiver apparatus.

14. (currently amended) An apparatus to efficiently decode a plurality of multimedia streams comprising:

buffers for storing multimedia data from said multimedia streams prior to decoding; and

arbitration logic to cause a particular multimedia stream to be serviced by a decoder based on the amount of multimedia data stored in one of said buffers for said particular multimedia stream, wherein said arbitration logic monitors amounts of data stored in said buffers for each of said multimedia streams and causes multimedia streams with relatively more stored data to be serviced by said decoder.

15. (canceled).

16. (original) The apparatus as in claim 14 further comprising:

one or more additional decoders to process multimedia streams responsive to said arbitration logic.

17. (original) The apparatus as in claim 14 wherein said multimedia streams are received from one or more satellite transponders.

18. (original) The apparatus as in claim 14 wherein said multimedia streams are received from one or more cable carriers.

19. (currently amended) A machine-readable medium having code stored thereon which defines an integrated circuit (IC), said IC comprising:

buffers for storing multimedia data from a plurality of said multimedia streams prior to decoding; and

arbitration logic to cause a particular multimedia stream to be serviced by a decoder based on the amount of multimedia data stored in one of said buffers for said particular multimedia stream,

wherein said arbitration logic monitors amounts of data stored in said buffers for each of said multimedia streams and causes multimedia streams with relatively more stored data to be serviced by said decoder.

20. (canceled).

21. (original) The machine-readable medium as in claim 19 wherein said IC further comprises:

one or more additional decoders to process multimedia streams responsive to said arbitration logic.

22. (original) The machine-readable medium as in claim 19 wherein said multimedia streams are received from one or more satellite transponders.

23. (original) The machine-readable medium as in claim 19 wherein said multimedia streams are received from one or more cable carriers.

24-31. (canceled).

32. (new) A multimedia receiver apparatus comprising:
a plurality of decoders for decoding a plurality of multimedia streams; and
arbitration logic to map each of said multimedia streams to each of said plurality of decoders based on processing load on each decoder and code rates of each of said multimedia streams, wherein said arbitration logic maps said multimedia streams once upon system initialization.

33. (new) The apparatus as in claim 32 wherein said decoders are Viterbi decoders.

34. (new) The apparatus as in claim 32 wherein said plurality of multimedia streams are greater in number than said plurality of decoders.

35. (new) A multimedia receiver apparatus comprising:
a plurality of decoders for decoding a plurality of multimedia streams; and
arbitration logic to map each of said multimedia streams to each of said plurality of decoders based on processing load on each decoder and code rates of

each of said multimedia streams, wherein said arbitration logic maps said multimedia streams continually as said multimedia streams are received and processed by said multimedia receiver apparatus.

36. (new) The apparatus as in claim 35 wherein said decoders are Viterbi decoders.

37. (new) The apparatus as in claim 35 wherein said plurality of multimedia streams are greater in number than said plurality of decoders.

38. (new) An apparatus comprising:

means for decoding a plurality of multimedia streams; and

means for mapping each of said multimedia streams to a plurality of decoding means based on processing load on each decoding means and code rates of each of said multimedia streams, wherein said mapping means maps said multimedia streams to equalize said processing load on each of said decoding means.

39. (new) The apparatus as in claim 38 wherein each of said decoding means comprises a Viterbi decoder.

40. (new) The apparatus as in claim 38 wherein said plurality of multimedia streams are greater in number than said plurality of decoding means.

41. (new) The apparatus as in claim 38 wherein said mapping means maps said multimedia streams once upon system initialization.

42. (new) The apparatus as in claim 38 wherein said mapping means maps said multimedia streams continually as said multimedia streams are received and processed.